

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

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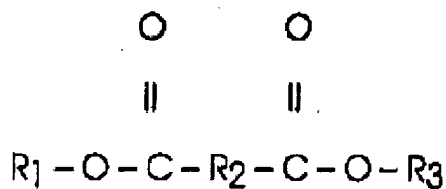
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**Title: MIXED ESTERS OF DICARBOXYLIC ACIDS FOR USE AS PIGMENT
5 DISPERSANTS**

ABSTRACT

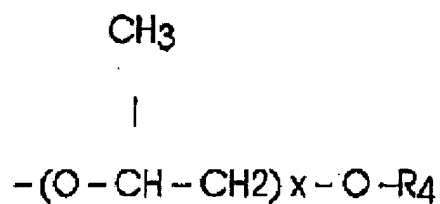
Novel mixed esters of dicarboxylic acids with monohydric fatty alcohols and propoxylated
fatty alcohols show unexpected superior properties as pigment dispersants, especially for inorganic
pigments used in foundations, make-ups, lipsticks and physical sunscreens. The compounds of the
10 present invention show superior pigment wetting and dispersing properties, as demonstrated by their
ability to form fluid, very high-solids dispersions, while exhibiting unusual emolliency and gloss
formation.

The novel compounds of this invention have the following structural formula:



wherein R₁ is has the structural formula:

5



wherein:

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R_4 is a saturated or unsaturated, substituted or unsubstituted aliphatic moiety containing from 4 to 24 carbon atoms;

X is an integer from 3 to 30;

R_2 is a saturated or unsaturated, substituted or unsubstituted aliphatic moiety which contains from 4 to 40 carbon atoms; and

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R_3 is a saturated or unsaturated, straight chain or branched chain aliphatic moiety containing from 12 to 24 carbon atoms. The preferred compounds are Octyldodecyl PPG-3 Myristyl Ether Dilinoleate and Isostearyl PPG-4 Butyloctyl Ether Dilinoleate.